Message

From: Porter, Andrea [/O=EXCHANGELABS/OU=EXCHANGE ADMINISTRATIVE GROUP

(FYDIBOHF23SPDLT)/CN=RECIPIENTS/CN=76C3B172E6574D44AE941300BD420B94-APORTE03]

Sent: 10/12/2016 2:49:17 PM

To: Sulej, Erik [Sulej.Erik@epa.gov]
Subject: FW: article --> "Collaborating in Flint"

Deliberative Process / Ex. 5

EPA-R5-2018-006908_0	000637

Deliberative Process / Ex. 5

Collaborating in Flint

Oct. 11, 2016

Michigan universities collaborate to examine water filters used by Flint residents

Researchers from Michigan State University, the University of Michigan and Wayne State University are conducting studies to determine the best ways to manage the type of point-of-use water filters being used by Flint residents.

The studies are supported by grants from the National Science Foundation.

Several previous studies have shown that point-of-use water filters can harbor and support the growth of bacteria in water, said Nancy Love, professor of civil and environmental engineering at U-M. Filters have been shown to work well to remove metals such as lead and chemicals produced during chlorination. Love emphasized that Flint residents should continue to use water filters in accordance with manufacturers' recommendations.

"All water, including drinking water, contains some amount of bacteria. The question is whether the bacteria are harmful," Love said. "Our research is focused on helping to determine how filters may be used to reduce or prevent transmission of harmful bacteria through the filters. Our study is well under way and we will make the results public once the scientific process is complete."

The research team is coordinating closely with the Michigan Department of Health and Human Services, the Genesee County Health Department and the Flint Mayor's Office.

Manufacturers typically recommend replacing filters after processing approximately 100 gallons. Susan Masten, professor of civil and environmental engineering at MSU, noted that the team is examining if this point-of-use replacement schedule is best for the Flint water distribution system.

"Based on the results we have gathered thus far, the filters are doing a good job removing lead and disinfection byproducts," Masten said. "These byproducts are the chemical compounds that occur after water has been disinfected and are measured as total trihalomethanes. So far, after filtration, these chemicals are typically at concentrations below what we can measure."

The research is expected to provide additional guidance about the use of filters in Flint.

Shawn McElmurry, associate professor of civil and environmental engineering at Wayne State, emphasized that the research group is committed to addressing residents' concerns and need for scientific information about the quality of their water.

McElmurry earned two degrees from MSU Engineering, a master's degree (2002) and a PhD (2008), both in environmental engineering.

The team appreciates the cooperation of Flint residents, which makes the study possible by providing access into their homes and supplying the filters used in the study.

With more than \$2.1 billion in research and development annually, the University Research Corridor is one of the nation's top academic research clusters. The URC's members — MSU, U-M and WSU — engage 12,000 world-class faculty members and 35,000 graduate students, elevating their undergraduate programs and supporting regional economies.